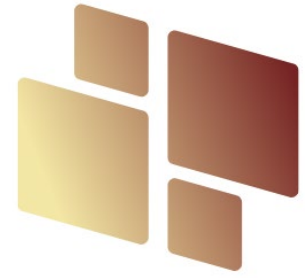


DELIVERABLE REPORT



VALHALLA

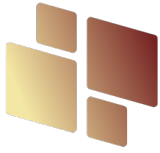
**D6.5-I - Scientific Workshop and
proceedings
LCA Workshop**

**Deliverable D6.5-I
JUNE-2023**

**PREPARED BY
Becquerel Institute
COORDINATED BY
UVEG**



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VALHALLA aims to develop perovskite solar cells and modules with power conversion efficiencies above 26 % (modules > 23 %) and extrapolated operational lifetime > 25 years, following an eco-design approach: employing harmful-solvent-free perovskite deposition, optimized use of materials, circularity, recyclability, scalable and low-cost manufacturing processes, to create a viable economic pathway for the European commercialization of this sustainable technology.

VALHALLA is formed by a multi-disciplinary consortium: 12 partners from 8 European countries; 3 industrial partners & 9 RTOs, covering the whole value chain of innovation from research centres to technology providers, end-users and market and policies.

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Table of Content

VALHALLA Consortium	3
Table of Content.....	4
List of Figures.....	4
Abbreviations and acronyms list	5
1. Executive Summary	5
1.1. Description of the deliverable content and purpose	5
1.2. Relation with other activities in the project.....	5
2. LCA Workshop	5
2.1. Technical details	5
2.2. Presenters.....	5
2.3. Goal of this workshop.....	5
1.3. Unfolding of the workshop.....	5
3. Conclusion	7

List of Figures

Figure 1 - Screenshot from the Workshop	6
Figure 2 - Presentations on VALHALLA's drive	6
Figure 3 - Workshop recording on VALHALLA's drive	6



Abbreviations and acronyms list

Abbreviation	Meaning
LCA	Life Cycle Analysis

1. Executive Summary

This document describes the goals and outlines the contents of the LCA workshop held on 24th May 2023 for the VALHALLA project participants. Project partners were initiated into LCA subjects and prepared for the extensive data collection process requiring their participation.

1.1. Description of the deliverable content and purpose

This internal Deliverable is intended to provide information on the scientific workshop held on May 24, 2023, by ULiège and BI.

1.2. Relation with other activities in the project

This workshop directly supports work on project sustainability aspects (WP5) in particular task 5.1 Eco-design and environmental LCA and task 5.2 Supply chain readiness for upscaling. It links partners working on WP1 Materials Development, WP2 Solar cell integration and characterisation and WP3 Encapsulation and Modules with those working on the sustainability tasks.

2. LCA Workshop

2.1. Technical details

The workshop took place online on May 24, 2023, from 10 to 12am through the platform Microsoft Teams. Each partner received an invitation from Maria Monrabal (UVEG).

2.2. Presenters

The workshop was moderated by Delinke Demeter (BI).
The presenters were:

- Afzal Peerukhan Khan (ULiège) - LCA training for non-Experts
- André Penas (BI) - Task 5.2 - Supply chain readiness for upscaling

2.3. Goal of this workshop

This workshop's goal was to help project partners to have a clear understanding of the process in an LCA/supply chain evaluation and the type and extent of data which is needed in order to have a good quality evaluation. It prepares project partners for the future data requests that will come from WP5 partners giving them both understanding and time to anticipate the data collection process.

1.3. Unfolding of the workshop

Mr Peerukhan (ULiège) had a 1hour and 15 min presentation followed by questions and Mr Penas (BI)



had a 20 min presentation followed by questions.

The workshop had a total of 28 participants and was recorded by Hendrik Jan Bolink (UVEG), the coordinator.

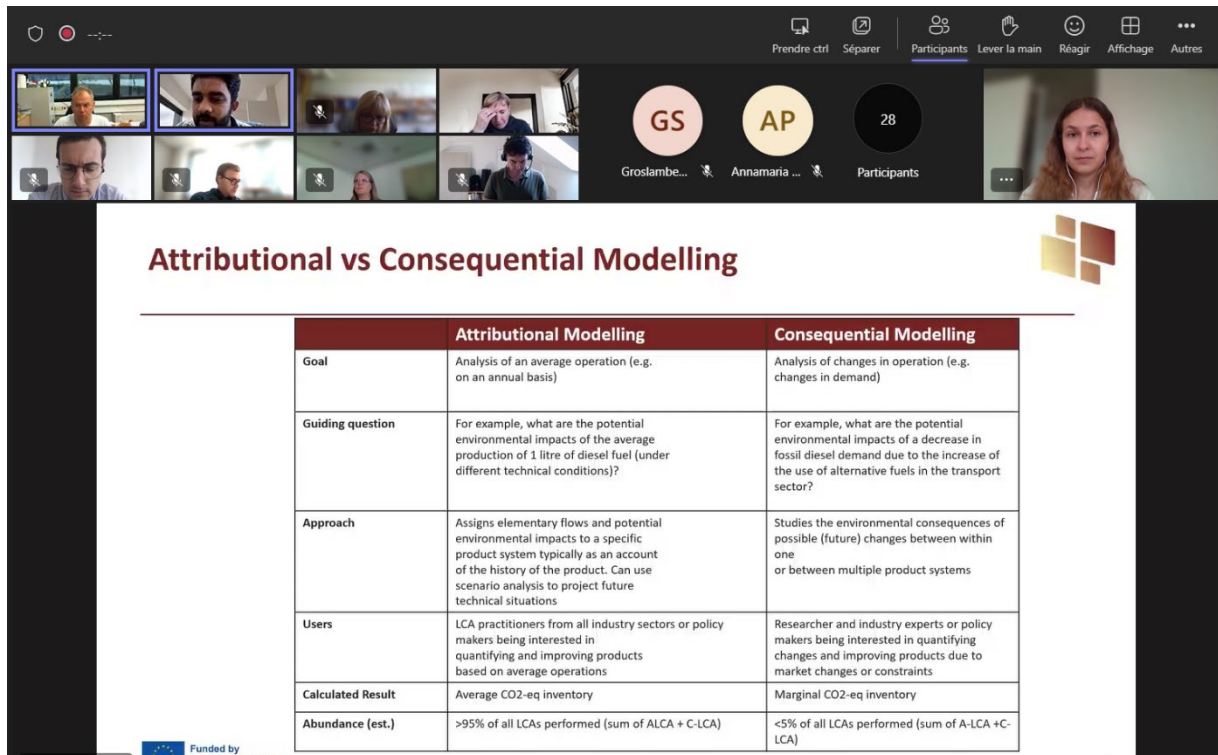


Figure 1 - Screenshot from the Workshop

The presentations were made available afterwards on the project shared drive.

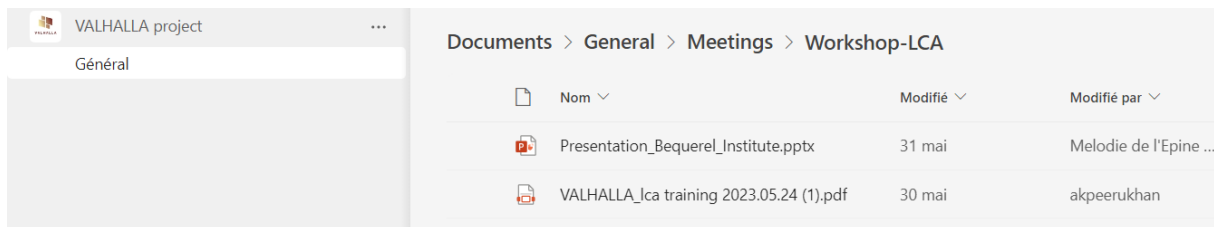


Figure 2 - Presentations on VALHALLA's drive

The coordinator made the recording available on the drive on 08/06/23.

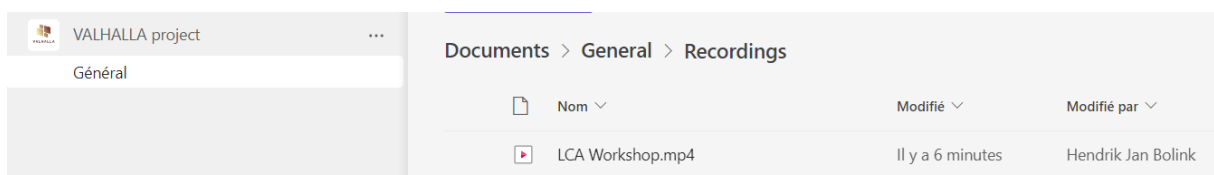
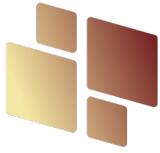


Figure 3 - Workshop recording on VALHALLA's drive



Questions asked during the workshop were concentrated on the following subjects:

- How geographical results impact the data
- The choice LCA method (PEF vs EPD), EU recommendations
- How ULiège and BI can articulate their work together

3. Conclusion

The workshop's goal was to facilitate future data collection for LCA and supply chain upscaling evaluations through informing project partners of the complexity, level of detail and information requirements for good analysis, and through the question-answer sessions ensure a good comprehension and readiness to participate. This goal was achieved in terms of knowledge sharing, however the impact on facilitating data supply will not be evaluated until the data collection phases are complete.